The tip of the iceberg. Incidence of disclosed cases of child sexual abuse in Switzerland: results from a nationwide agency survey

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Abstract: OBJECTIVES: Child sexual abuse (CSA) is considered a major risk factor for a variety of health problems both in childhood and in later adult life. While population-based surveys aim to establish the real incidence rates of CSA by interviewing potential (past) victims, agency surveys focus on the rates of CSA reported to the authorities. METHODS: We conducted a nationwide agency survey of CSA in Switzerland. Data were collected from 350 agencies through an anonymous online form during a 6-month period. For data collection, we used a modified version of the case reporting form translated from the American National Incidence Study (NIS-4). RESULTS: About 2.68 cases of CSA per 1,000 children per year are disclosed to agencies (1.11 in males, 4.33 in females). This is roughly twice the average incidence rate reported in methodologically similar studies from Canada, the US, and Australia. CONCLUSIONS: In Switzerland, the majority of disclosed cases of CSA are handled by specialized yet semi-public agencies instead of public child welfare agencies or penal authorities. This fact might explain the higher disclosure rates.

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The tip of the iceberg.

Incidence of disclosed cases of child sexual abuse in Switzerland:

Results from a nationwide agency survey.

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Introduction

Child sexual abuse (CSA) is a form of child abuse that involves a child in sexual activity that the child does not fully comprehend, is unable to give informed consent to, or is not developmentally prepared for (International Society for the Prevention of Child Abuse and Neglect 2010). The relationship between perpetrator and victim is defined as one of responsibility, trust, and/or power being abused by the perpetrator to gratify his or her sexual needs. Swiss criminal law prohibits all kinds of sexual activity between an adult and a child (<16 years) if there is an age difference of more than three years, between a minor (<18 years) and an adult if they are in a relationship of dependency, and all sexual activity that is enforced without the other person's consent, regardless of the ages of victim and perpetrator (Swiss Penal Code 1937). That means that CSA cannot only occur between a child and an adult but also among children or adolescents, a fact that has long been neglected (Schönbucher et al. 2011). CSA can be committed by family members, relatives, neighbors, acquaintances, friends, teachers, strangers, or peers. It is considered a major risk factor for a variety of health problems in both childhood and later adult life (Cichetti and Toth 2005; Fergusson et al. 2008; Jud 2008a; Landstaedt and Gillander Gådin 2010). Since Finkelhor's first studies on CSA in the late 1970s (Finkelhor 1979; Finkelhor 1982), researchers have intensified their efforts to establish robust epidemiological data on various aspects of CSA. Given the fact that CSA is usually clandestine by nature, reliably assessing the incidence of CSA poses a number of methodological challenges (Trocmé 2008; Fallon et al. 2010). Some studies collect information on CSA directly from victims, usually retrospectively from adult survivors of CSA (Fergusson et al. 2008). Other studies are based on indirect surveys among professionals and service providers (Trocmé et al. 2010; Sedlak et al. 2010; Australian Institute for Health and Welfare 2010; US Department of Health & Human Services 2010), or on compilations from various official databases (e.g. National Data Archive on Child Abuse and Neglect 2011). Child protection agencies and authorities are involved in only a minority of cases of CSA because victims are often unable or reluctant to disclose or to initiate external interventions (Jud 2008b). Therefore, only a small proportion of CSA cases are presumed to be reported to professionals or to the authorities, resulting in a substantial number of unreported cases (e.g. Trocmé et al. 2010; Gilbert et al. 2009). To date, no comprehensive nationwide data on the incidence of reported cases of CSA in Switzerland have been gathered.

The types and accessibility of child protective services vary considerably across countries. In Switzerland, the institutional provision of child protective services is organized according to the political principles of federalism and subsidiarity (Häfeli and Voll 2008; Voll 2008). Thus, services are divided between municipalities, states (so-called cantons) and the Swiss Confederation, with a pronounced diversity of agencies and organizations amplified by linguistic and cultural differences in different parts of the country. Furthermore, private or semi-

private agencies play an important role in the provision of CSA services. Taken together, service providers in Switzerland can be categorized into three different groups including 1) child welfare authorities; 2) penal authorities (police, courts); and 3) voluntary or private child protective services (Häfeli 2005).

Based on a nationwide agency survey this study aimed at: (1) establishing the annual incidence rate of reported cases of CSA in Switzerland, (2) assessing the sociodemographic characteristics of victims and perpetrators, and (3) evaluating the role of different types of child protection agencies in the handling of cases of CSA maltreatment.

Methods

Sampling

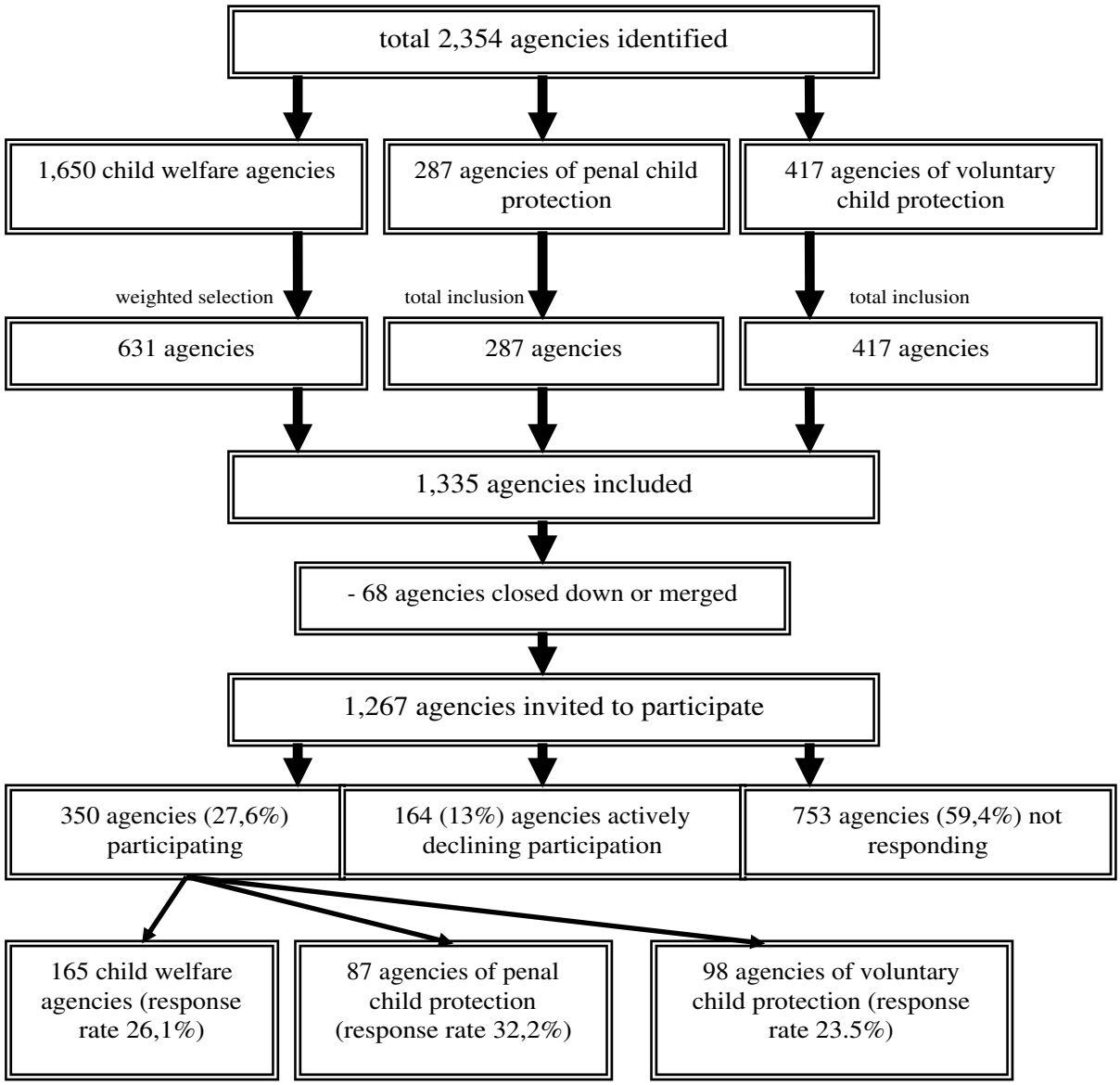
Based on publicly available information, official data sources from cantonal and federal authorities and previous studies (Jud 2008c), all Swiss institutions, organizations and services ("agencies") potentially handling cases of child sexual abuse were compiled and categorized according to the three categories mentioned previously. This compilation resulted in the identification of 2,354 agencies, namely, 1,650 agencies involved in civil child protection (child welfare agencies), 287 in penal child protection and 417 in voluntary child protection (figure 1). Of these 2,354 agencies, a representative sample of 1,267 agencies was selected by applying the following inclusion criteria: In the majority of cantons, few centralized penal authorities or voluntary child protection agencies exist. Therefore, a complete inclusion strategy was followed for the agencies in these two categories. The total number of 1,650 public child protection authorities (child welfare agencies), however, was reduced through stratified sampling by community population. As the median community population in Switzerland is 1,034 inhabitants (Swiss Federal Office for Statistics 2009), we created a first stratum consisting of communities with populations of up to 999 inhabitants. As public child protection authorities in these low-population communities address very few cases of child abuse, only a small weighted sample was included. Each subsequent stratum was double the community population size of the previous stratum and was given a slightly higher weight. Every community with a population of 8,000 inhabitants and above (138 communities) was included, as they represent roughly half of the population of the cantons with communal child protection authorities. Finally 631 child welfare agencies were included. Eventually 68 selected agencies turned out to be closed down or merged to other agencies in the meantime.

The resulting 1,267 agencies were first contacted by mail explaining the goals of the study and invited to participate in the study by reporting new cases of child maltreatment handled by their agency during a six-month

data collection period (March 2010 - August 2010). A subsequent letter was sent four weeks later to all selected agencies to provide them with individual login data which allowed them to log in to a secured sever so that they can easily and anonymously report their data online. To encourage participation, an incentive of 50 Swiss Francs (~ 40 €) per reported case was offered. During the entire data-collection period, a (phone and e-mail) help-line was available to assist agencies in reporting data. To improve the participation rate, a reminder was sent in June 2010 to all institutions that had not yet participated or responded to our letters. Additionally, agencies with a high priority status (n=434) were also contacted by telephone. A high priority status was given to all civil or penal child protection institutions that were responsible for a population size of over 16,000 and to all institutions that specialized in child maltreatment.

Overall, 164 agencies (13%) actively declined participation, mainly because of a lack of human resources, whereas 753 agencies (59.4%) neither responded to our invitations nor actively denied participation. Most of the non-responding agencies were given low priority and were therefore not contacted by phone. The great majority of these agencies were child welfare agencies in communities with less than 999 inhabitants. We therefore felt it was reasonable to assume that most non-responding agencies had few or no cases of CSA to report.

Figure 1: Flowchart of sampling and participation, Optimus Agency Study, Switzerland 2010



Measures

Our study used an online case reporting form adapted from the National Incidence Study of Child Abuse and Neglect (NIS-4) form (Sedlak and Webb 2008) and is therefore methodologically equivalent to the American NIS-4-study as well as the Canadian Incidence Study (CIS-2008) (Trocmé et al.2010). Translation of the original English form into German, French and Italian (the three Swiss national languages) versions followed previously published guidelines, including the use of independent back-translation (Brislin et al. 1973). The form was adapted to the specific cultural context in Switzerland with regard to wording and terminology (types of agencies and interventions). The case reporting form comprised 24 items: 13 assessed characteristics of the victim, including gender, age, possible disabilities, type and severity of abuse, time of abuse and substantiation of abuse;

8 items collected information on the child's family and social background, including information about the primary caregiver and household composition; 1 item assessed the assumed perpetrator, including the number and age of perpetrator(s) and the perpetrator's relationship to the child; and 2 items covered information about interventions, including the type of intervention and other involved institutions.

We collected all cases of CSA reported to the agencies between March 1, 2010, and August 31, 2010. Acts of sexual abuse were categorized as follows: a) contact abuse with penetration (vaginal or anal), b) contact abuse without penetration, or c) non-contact sexual abuse. Agencies were asked to classify the severity of the abuse according to six categories: a) extremely serious (fatal), b) serious, c) moderate, d) possible harm, e) endangerment, or f) no harm. The agencies were also asked to indicate whether the case was substantiated, indicated or only suspicious. "Substantiated" in the judgment of the reporting agencies did not necessarily mean forensic substantiation.

Data analysis

The data were checked for double entries. Twelve cases were entered twice by mistake and, after verification with the entering agency, were deleted. All cases that were reported to the agencies before or after the data collection period were removed from the dataset. To identify any children that were referred to more than one institution, probabilistic techniques were used to link duplicate reports on a given child (Sedlak and Webb 2008). To ensure anonymity, these techniques relied on somewhat less-than-perfect matches on data items that did not uniquely identify the child. A combination of the following features, was applied to identify duplicates in the data set including 1) Second letter of the child's first name; 2) Third letter of the child's last name; 3) Day and year (but not month) of the child's birth; 4) Child's gender; and 5) Canton and the last two letters of the postal code of the child's place of residence. By using this procedure, we identified 74 children reported more than once: 64 children were referred to two different agencies, 9 children were referred three times and 1 child was referred four times, resulting in 85 reports that had to be excluded from further analysis. The excluded duplicate cases were cases referred at a later date.

A statistical weighting procedure was applied to estimate of the national annual incidence rates. This weighting procedure accounted for the varying response rates in different geographical areas and in different types of agencies. Public child protection institutions that were sampled in a canton associated with a weighted sampling strategy were assigned a design weight inversely related to their sampling probability. Because the sampling probability for institutions in cantons with a complete sampling was 1, design weights were assigned the same number. The probability of participation was analyzed based on a stratified logistic model considering contact

priority, the type of institution and language area. This was used to adjust for non-participating institutions. Together with the design weights, the weights used to adjust for non-response were used to estimate the total number of new referrals to child protection agencies during the half-year period of data collection. Assuming that the number of referrals would not differ significantly in the other half year not included in the data collection, a factor of 2 was added to estimate the number of referrals for one year. Estimates of standard errors were analyzed using the jackknife method, in which single sampling units are treated as units that contribute nothing to the standard errors. As the sampling fraction surpassed 5% of the population, a stratified finite population correction (FPC) was considered. As the weights, the FPC, too, has been adjusted for non-response. Confidence Intervals (CI) have been calculated at the 95% level. Rates per 1,000 inhabitants were calculated using the 2010 population (Swiss Federal Office for Statistics, 2013). The procedures applied to compare subgroups of weighted estimated totals differ from analyses of sample subgroups. Therefore, we tested the null hypotheses of equal group sizes by applying Wald test of linear hypotheses after estimation. All statistical analyses have been performed using Stata 11 (StataCorp 2009).

This study was approved by the ethics committee of the canton of Zurich, where the study was organized and administered.

Results

Participation

Overall, 350 agencies (27.6%) participated in our survey and 911 new cases of CSA were reported during the six-month data collection period. Of the 350 participating agencies, 165 (47%) were public child protection authorities (child welfare agencies), 87 (25%) were penal agencies and 98 (28%) were voluntary child protection agencies. Considering the participation rates by type of institution, the penal agencies showed the highest participation rate (32.2%), followed by child welfare agencies (26.1%) and voluntary child protection (23.5%) agencies. The 98 participating voluntary child protection agencies, most of which were highly specialized institutions, reported 64% of the cases (N=583), while the 164 participating child welfare authorities accounted for only 13.5% of the reports (N=123); 22% (N=200) of the cases were reported by the 88 participating penal authorities.

Table 1: Incidence rates of child sexual abuse (CSA) reported to authorities. Optimus Agency Study, Switzerland 2010

Type of CSA	**Total** per 1,000 children		**Male** per 1,000 children		**Female** per 1,000 children		Adj. Wald test for male = female (F)
	Est.	C.I.	Est.	C.I.	Est.	C.I.	
Any sexual abuse	**2.68**	**1.45-3.91**	**1.11**	**0.59-1.62**	**4.33**	**2.27-6.40**	**14.53*****
Contact abuse with penetration	0.72	0.08-1.36	0.24	0.05-0.43	1.22	0.07-2.37	3.75^{+}
Contact abuse without penetration	1.16	0.56-1.76	0.59	0.28-0.90	1.77	0.82-2.72	10.13**
Non-contact abuse	0.45	0.28-0.63	0.25	0.13-0.38	0.67	0.38-0.96	8.18**
Type of sexual abuse not clear	0.70	0.47-0.92	0.22	0.11-0.33	1.20	0.79-1.61	25.34***

Estimates based on 911 reported cases; $^{+}p < 0.01$; ** $p < 0.01$; *** $p < 0.001$

An estimated 3,891 new cases of child (<18 years) sexual abuse are reported to child protection services per year in Switzerland. This corresponds to an annual rate of 2.68 CSA-related investigations/1,000 children (<18 years). All forms of CSA were more frequently reported in girls. The majority of cases were classified by agencies as contact abuse.

Table 2: Type of sexual abuse according to gender, age category and the number of reported annual cases per 1,000 children. Optimus Agency Study, Switzerland 2010

	0 - 5 years						6 - 11 years		12 - 17 years		**Total**	
			>1 year		1 - 5 years							
	M	F	M	F	M	F	M	F	M	F	**M**	**F**
Sexual abuse (CSA)	0.98	2.09	<0.01	0.08	1.18	2.49	1.45	3.44	0.73	6.45	**1.11**	**4.33**
Contact CSA with penetration	0.13	0.59	<0.01	<0.01	0.15	0.71	0.41	0.50	0.17	2.19	**0.24**	**1.22**
Contact CSA with-out penetration	0.51	1.04	<0.01	0.08	0.61	1.23	0.88	1.87	0.35	1.87	**0.59**	**1.77**
Non-contact CSA	0.13	0.15	<0.01	<0.01	0.16	0.18	0.31	0.59	0.27	1.17	**0.25**	**0.67**

Estimates based on 911 cases. The age group 0-5 years is shown both combined and divided into subgroups of 0-1 years and 1-5 years. Because the exact birth date of the victims was not recorded for reasons of anonymity (only the year and the day were recorded), the data lack some exactness with regard to the age groups assignments.

Sexual abuse (all forms) in females was most frequently reported in the age group 12 - 17 years, most frequently in the form of contact abuse with penetration. In males, sexual abuse was most frequently reported in the age group of 6 - 11 years.

Table 3: Frequency and substantiation of sexual abuse by abuse category. Optimus Agency Study, Switzerland 2010

	Frequency of abuse			Substantiation of abuse			
	Single incident	Repeated incident	Regular abuse	Suspicion	Indicated	Substantiated	Unclear/not applicable
Contact abuse with penetration	33.0%	31.3%	35.7%	13.3%	41.5%	43.1%	2.1%
Contact abuse without penetration	35.7%	41.8%	22.5%	13.4%	40.8%	41.9%	3.9%
Non-contact abuse	41.9%	44.5%	13.6%	12.2%	32.6%	48.8%	6.3%
Other/unknown abuse	38.4%	42.2%	19.4%	22.9%	37.8%	31.8%	7.5%

Contact abuse with penetration occurred more frequently in cases where abuse had been repeated or was a regular occurrence. The less invasive forms of abuse, namely “contact abuse without penetration” and “non-contact sexual abuse”, were categorized as isolated incidents in 36-42% of cases (Table 3). In the vast majority of cases, agencies considered the abusive acts to be highly probable or even established. There was little difference regarding levels of substantiation between the different categories of child abuse. Only the category “other/unknown abuse” was more frequently classified as “suspected”.

Perpetrators

According to the agency reports, fathers were most frequently identified as the perpetrators of sexual abuse (Table 4). When stepfathers, adoptive fathers and foster fathers were included in the analysis, almost one fourth (23.5%) of CSA cases were attributed to adult males living with the child (sum of categories 8 & 9). Mothers and other female adult caregivers as a group were suspected to be involved in 4.5% of CSA cases (categories 10 & 11). Sexual abuse suspected to be committed by peers, such as (ex-)friends, colleagues or neighbors, was the most frequent category; namely, 24% of cases were reported as being committed by this type of perpetrators (categories 2 & 3), and a further 8.5% of cases were reported as being committed by siblings or other non-adults

living with the victim (sum of categories 4, 5, 6, 7). Strangers or "other adults" accounted for roughly 21% of sexual abuse cases (categories 1 & 15).

Table 4: Perpetrators by number of reported annual cases per 1,000 children. Optimus Agency Study, Switzerland 2010

Perpetrator	Cases/1,000 children	CI (95%)
1. Stranger	0.30	0.17-0.43
2. Boy- or girl-friend, date, ex-boy- or girl-friend	0.11	0.06-0.16
3. Friend, colleague, neighbor (under 18 years of age)	0.54	0.27-0.82
4. Brother, step-brother	0.15	0.04-0.25
5. Sister, step-sister	<0.01	n.a.
6. Other child living with the victim	0.03	0.00-0.06
7. Non-adult relative not living with the victim	0.05	0.00-0.09
8. Biological father	0.53	0.27-0.78
9. Step-father, foster father, adoptive father	0.10	0.04-0.17
10. Biological mother	0.12	0.05-0.19
11. Step-mother, foster mother, adoptive mother	<0.01	n.a.
12. Partner of parent or other adult living with the victim	0.05	0.01-0.08
13. Partner of parent not living with the victim	0.04	0.02-0.07
14. Adult relative not living with the victim	0.18	0.06-0.29
15. Other adult person not living with the victim	0.27	0.13-0.40
16. Other person	0.22	0.08-0.35

Estimates based on a sample of N=911 cases

Severity of harm

In general, female victims were considered by the authorities to be more seriously affected than male victims (Table 5).

Table 5: Severity of harm by the victims' gender, number of reported annual cases per 1,000 children and percentages. Optimus Agency Study, Switzerland 2010

Severity of harm	Male			Female		
	cases per 1000			Cases per 1000		
	Est.	CI (95%)	%	Est.	CI (95%)	%
No harm	0.12	0.03-0.21	11	0.85	0.47-1.24	20
Endangered	0.27	0.10-0.43	24	0.78	0.50-1.06	18
Probable	0.26	0.13-0.40	24	0.63	0.42-0.84	15
Moderate	0.22	0.04-0.40	20	0.74	0.21-1.28	17
Serious	0.24	-0.02-0.50	22	1.32	-0.04-2.69	31
Fatal	<0.01	n.a.	0	<0.01	n.a.	0

Estimates based on 911 cases.

Discussion

This is the first study that generated national estimated rates of CSA reported to agencies in Switzerland. The main finding of our survey is that an estimated 2.68 out of 1,000 children per year give reason to further investigations by professionals as some form of CSA against them is suspected. Compared with findings from the U.S., Canada and Australia, the estimated rate is relatively high. The Canadian Incidence Study reported incidences ranging from 0.86 investigations per 1,000 children in 1998 to 0.43 cases per 1,000 children in 2008 (Trocmé et al.2010). The National Incidence Study (NIS) in the U.S. revealed rates of 1.9 cases per 1,000 children in 1986 (NIS-2), 3.2 per 1,000 children in 1993 (NIS-3) and 1.8 per 1,000 children in 2005/2006 (NIS-4) (Sedlak et al. 2010). In Australia, a rate of 0.62 cases per 1,000 children was found in 2008/2009 (Australian Institute for Health and Welfare 2010).

Several factors may contribute to these considerable cross-national differences, including differences in the availability, accessibility, specialization and mandates of agencies; general awareness and attention paid to the problem of child maltreatment; political, legal, social and cultural conditions of a given country; and ethnic and social diversity of the population. Compared to other countries, Switzerland has a particularly complex child protection system. Thousands of different agencies, services and authorities are involved in the handling of child protection cases. Different types of agencies have different degrees of specialization, different focuses and different mandates. Unlike in the U.S. or Canada, there is no mandatory reporting requirement for professionals in cases of CSA in Switzerland (Matthews and Kenny 2008; Rankin and Ornstein 2009; Sutter 2008). The

problem of CSA is therefore not sufficiently described by the official statistics of penal or civil authorities. In our study, which aimed to gather data from all relevant agencies, almost two-thirds of the cases were reported by private child protection agencies. These highly specialized agencies obviously handle an important proportion of CSA cases and showed comparably high participation rates. Although our statistical weighting procedure corrected for the varying response rates of different types of agencies, cases handled by these specialized private agencies may be overrepresented in our findings. It is an open question as to whether the relative importance of such highly specialized private agencies leads to greater disclosure rates compared to those in countries with a system based on public child protection agencies. The comparably high incidence rates found in the present study may provide an indication for that assumption. Obviously in Switzerland children, adolescents, families and professionals confide in these semi-official agencies.

Additionally, methodological differences in data gathering may explain some of the variance in incidence rates across countries. We used a pragmatic method for collecting data from a multitude of different agencies. By addressing agencies directly and by providing them with an easily manageable online data reporting form, we sought to maximize the amount of information obtained from the agencies. Response rates of approximately 25% may seem rather low, but by accounting for the varying importance of reporting and non-reporting agencies and by weighting the reported cases statistically, valid estimates of the annual incidence of child maltreatment may nevertheless have been produced by this study. It is possible, however, that the distribution of caseloads between responding and non-responding agencies is unequal and that our estimates are biased – most likely by overestimating the number of cases, as non-responding agencies may handle fewer cases.

Because there is no nationwide coordination and no methodological alignment between different types of agencies, the quality of information gathered by agencies for their own documentation of cases may vary considerably. Missing information in some of the required items (e.g., nationality of parents, approximate income of the victim's household, education of primary caregivers) indicated the limitations of some agencies' information on their cases. Again, highly specialized and professional agencies proved to be better prepared for our request and provided complete data in most cases.

Our estimates of the annual number of reported CSA cases represent only the minimum number of actual cases of sexually abused children, as only a small fraction of all cases are ever reported to agencies. Different studies have attempted to estimate the true incidence of CSA through direct population surveys and found lifetime prevalences of up to 50%, depending on the type of abuse, population under investigation and gender (Barth et al. 2012). In a representative school survey on the incidence of CSA in Switzerland conducted recently by our research group, we found rates of abuse 10 to 50 times higher than those revealed in the current agency study

(Mohler-Kuo et al., unpublished). Based on these comparisons, we can estimate a proportion of undisclosed cases of approximately 90% for severe forms of child abuse, such as contact abuse with penetration. This estimate is in line with results from previous research (Gilbert et al. 2009). For less severe forms of abuse, such as non-contact abuse, the proportion of unreported cases is most likely even higher.

The findings of this agency survey show similar patterns of abuse compared with those identified from direct population surveys. Sexual abuse affects girls far more frequently than boys, and agencies consider girls to be more severely harmed by the abuse than boys (cf. Landstaedt and Gillander Gådin 2010). However, it is possible that the effects of abuse are less obvious in male than female victims. Similar to our findings in the school survey (Mohler-Kuo et al. unpublished), perpetrators are most frequently family members or peers. Male adults living with the child like father, stepfather, foster father, male partner of the mother, account for nearly one third of the cases. A finding that is consistent with results from earlier studies (Finkelhor 1994). Children are most often endangered and victimized by their own family members in the following order of incidence: fathers > siblings > mothers > other caregivers. Peers like (ex-) friends, dates, colleagues, adolescent neighbors account for nearly 25% of the abuse cases. This category of perpetrators appears to have been underestimated as far as earlier studies reported lower rates of sexual abuse between adolescents (e.g. Ackard and Neumark-Sztainer 2002). The high frequency of peer perpetrators deserves special attention because this category of perpetrators may not currently be the focus of prevention.

Not surprisingly, it appears that more severe cases are reported more frequently to agencies, while less severe forms of abuse – much more frequent in occurrence – are most likely disclosed to professionals only occasionally. Around 25% – 30% of reported child sexual abuse cases involve penetration, a finding that is in line with literature (Finkelhor 1994). As less severe forms of abuse are less frequently reported to penal authorities, these agencies deal primarily with severe cases of abuse (e.g. Maguire 2009). By far, private or semi-public agencies handle the most cases of child abuse. This may be a consequence of insufficient service structures among official authorities or a lack of confidence in the authorities. The involvement of a semi-public or private professional agency may also be perceived as less embarrassing by victims. Under Swiss law, there is no obligation for professionals to refer cases of child abuse to the authorities or to report them (Sutter 2008).

Conclusions

The incidence of reported cases of CSA in Switzerland appears to be higher than in comparable other countries. The majority of CSA cases in Switzerland are handled by highly specialized, although semi-official institutions. This fact may contribute to the comparably elevated incidence of reported cases in Switzerland. The relative

importance of this type of child protective service should be taken into account when planning future prevention programs. However, it is important to highlight that only a small fraction of CSA cases are reported. Compared with findings from population surveys, it can be estimated that less than 5-10% of CSA cases are currently reported to agencies. Open questions for further research are: Why, when and by whom cases of CSA are (not) disclosed to agencies? Which characteristics of agencies facilitate the disclosure of cases of CSA? With regard to the prevention of CSA our results encourage efforts towards an increased public awareness and towards higher professional standards of agencies. Certain types of potential perpetrators of CSA such as adolescent peers should be addressed specifically by future prevention programs.

Limitations

The results of this study are estimates based on information from approximately 25% of the agencies potentially involved in child protection. However, participation has been particularly low in the French- and Italian-speaking parts of Switzerland - a fact that might not have been sufficiently addressed by weighting procedures. Overall, participating agencies might have been particularly sensible to the topic of CSA. This potential bias might be associated with an increased tendency to investigate reports for CSA which in turn might lead to increased incidence of CSA. National estimates have therefore to be interpreted cautiously. The statistical weighting procedure holds some further limitations: while differences in response rates between different types of agencies and between urban and rural areas are considered, possible seasonal disparities in reporting are ignored. Moreover, the degree of substantiation was based solely on the agencies' valuation rather than on the legal quality of substantiation.

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